



### **Postdoctoral Fellow in Land-Water Greenhouse Gas Fluxes**

The Ecosystems and Global Change Group ([www.ecosystemchange.com](http://www.ecosystemchange.com)) at Trent University jointly led by Prof Andrew Tanentzap (Canada Research Chair in Climate Change and Northern Ecosystems) and Dr Erik Emilson (Research Scientist, Canadian Forest Service sector of Natural Resources Canada, <https://glfc-wet.github.io>) is recruiting a two-year postdoctoral researcher to work on **Nature-based solutions to limit greenhouse gas emissions from freshwaters**. The anticipated start date is Feb 2026.

**Project description:** Forest management is a pillar of mitigating climate change. But forests lose vast amounts of organic matter into receiving waters that risks offsetting their ability to sequester atmospheric carbon. You will quantify the amount of carbon lost from boreal forests and lakes by establishing two eddy flux covariance towers in northwestern Ontario, Canada. You will trace the flow of carbon seasonally from land and water into the atmosphere, and characterise the associated biogeochemical drivers alongside a team of other researchers. The outcomes will inform a catchment-level experiment that will manipulate forest management, such as wildfire.

The Fellow will be responsible for installation and day-to-day operation of the flux towers with some training and support provided from a co-supervisor with expertise in micrometeorology. The Fellow will be expected to process, analyse, and interpret flux data, as well as help guide the overarching science questions.

**Candidate specifications:** The successful candidate should have a proven track record of publication in leading peer-reviewed journals and hold, or shortly hold, a PhD in ecology, biogeochemistry, atmospheric/environmental chemistry, or a related discipline. You will have experience with gas exchange measurements using eddy flux covariance systems. The candidate will be expected to mentor junior team members, so leadership experience will be advantageous.

Funds for this position are initially available for two years with the possibility of renewal.

**What we can offer:** Our research training environment features some of the most advanced environmental research infrastructure in Canada, including access to the most comprehensive mass spectrometry facility in Canada, leading-edge genetic sequencing facilities, and radioisotope and stable isotope labs, with extensive support for field research (ATVs, snowmobiles, autonomous

surface vessel). As our team partners with government scientists, you will have a unique opportunity to influence environmental policy and make connections outside of academia to bolster your career.

We offer competitive wages (starting \$55k/yr; negotiable) plus enhanced health and dental benefits. Peterborough is one of the most affordable and desirable places to live in Ontario, offering the best of urban (70 mins to Toronto) and rural living all under 30 minutes to the heart of the Kawarthas that boasts endless lakes and forests to explore. Our group supports flexible working arrangements and encourages applicants from diverse backgrounds as we strive to build a more equitable, diverse, and inclusive workplace. Overseas applicants will be supported in applying for a Work Permit.

**How to apply:** Please email Andrew Tanentzap ([atanentzap@trentu.ca](mailto:atanentzap@trentu.ca)) with a CV and brief cover letter describing what you hope to get out of working with us, how your research interests are a good fit to our group, and how your past experiences make you suitable for this position. The **application deadline is 7 Nov 2025.**